

Title (en)

SECURITY ELEMENT WITH COLOR SHIFT EFFECT AND MANIPULATION DETECTION

Title (de)

SICHERHEITSELEMENT MIT FARBKIPPEFFEKT UND MANIPULATIONSNACHWEIS

Title (fr)

ÉLÉMENT DE SÉCURITÉ AVEC EFFET DE CHANGEMENT DE COULEUR ET MISE EN ÉVIDENCE DE MANIPULATION

Publication

EP 3170168 A1 20170524 (DE)

Application

EP 15738262 A 20150420

Priority

- AT 5652014 A 20140717
- EP 2015000823 W 20150420

Abstract (en)

[origin: WO2016008553A1] The invention relates to a security element with manipulation detection, in particular a security label or a transferable element, having the following layers: a) a first layer which is an embossed support substrate or a support substrate (1) with a coating layer (6) that has an optically active structure (7) or a first liquid crystal layer, b) a second layer which is a liquid crystal layer (3), c) a light-absorbing layer (4), and d) an adhesive layer (5), wherein the adhesion between the layers a. and b. is lower than the adhesion between the layers b., c., and d., and the security element has a color shift effect.

IPC 8 full level

G09F 3/00 (2006.01); **C09J 7/20** (2018.01); **G09F 3/02** (2006.01); **G09F 3/03** (2006.01); **G09F 3/10** (2006.01)

CPC (source: AT CN EP US)

B42D 25/324 (2014.10 - AT); **B42D 25/328** (2014.10 - AT); **B42D 25/364** (2014.10 - AT); **C09J 7/20** (2017.12 - EP US); **G02B 5/1814** (2013.01 - US); **G02B 5/1828** (2013.01 - US); **G03H 1/0011** (2013.01 - US); **G09F 3/0292** (2013.01 - AT CN EP US); **G09F 3/0341** (2013.01 - CN EP US); **G09F 3/10** (2013.01 - CN EP US); **C09J 2203/334** (2013.01 - US); **G09F 2003/0245** (2013.01 - CN EP US); **G09F 2003/0257** (2013.01 - US); **G09F 2003/0276** (2013.01 - CN EP US)

Citation (search report)

See references of WO 2016008553A1

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

WO 2016008553 A1 20160121; AT 516128 A1 20160215; AT 516128 B1 20180515; CN 106463071 A 20170222; EP 3170168 A1 20170524; JP 2017530380 A 20171012; MX 2017000787 A 20170504; RU 2016146202 A 20180817; US 2017249875 A1 20170831

DOCDB simple family (application)

EP 2015000823 W 20150420; AT 5652014 A 20140717; CN 201580027336 A 20150420; EP 15738262 A 20150420; JP 2017502667 A 20150420; MX 2017000787 A 20150420; RU 2016146202 A 20150420; US 201515310153 A 20150420